



UNITED STATES PATENT AND TRADEMARK OFFICE

mm
UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------|------------------|
| 09/578,156 | 05/23/2000 | Lundy Lewis | APB-019 | 4279 |
| <div>959 7590 04/30/2007 LAHIVE & COCKFIELD, LLP ONE POST OFFICE SQUARE BOSTON, MA 02109-2127</div> | | | | |
| <div>EXAMINER SWEARINGEN, JEFFREY R</div> | | | | |
| <div>ART UNIT PAPER NUMBER 2145</div> | | | | |
| <div>MAIL DATE DELIVERY MODE 04/30/2007 PAPER</div> | | | | |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

09/578,156

Applicant(s)

LEWIS, LUNDY

Examiner

Jeffrey R. Swearingen

Art Unit

2145

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 February 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6,9-13,15-18 and 20-26 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6,9-13,15-18 and 20-26 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 2/22/2007 has been entered.

Response to Arguments

2. Applicant's arguments filed 2/22/2007 have been fully considered but they are not persuasive.

3. Applicant's amendments failed to alter the scope of the claimed subject matter.

4. The amendment from a desired state to a desirable state does not overcome the 112 issue that a desirable state or undesirable state is an indefinite term. One of ordinary skill in the art cannot determine what is desirable and undesirable from the claim language presented. Applicant pointed out the relevant inquiry was "whether the ... specification provides some standard for measuring that degree." Applicant failed to point out where in the specification a desirable state was clearly described to one of ordinary skill in the art. Pages 62-63 of the specification as cited by Applicant do not provide the standard called for in the relevant inquiry. Applicant was explicitly informed that the amendment to a desirable state would not overcome the 112 issue in the office action of 12/13/2006.

5. The minimal alterations in the claimed subject matter still read upon Feridun. Applicant elected not to amend the claims around the prior art reference.

6. Applicant argued that Feridun failed to disclose *an alarm correlation agent that receives the generated alarms from the monitoring agents, wherein the alarm correlation agent determines a current state of the service based on the received alarms*. Applicant's argument that Feridun's events are not alarms is vague and unclear. One clear example showing that Feridun's events are alarms is located in column 10, lines 54-62. In this passage, Feridun looks for "events" corresponding to a suspended attack on a network as part of a security and firewall system. One of ordinary skill in the art is well conversed in

Art Unit: 2145

the fact that security systems commonly refer to events in the system detecting a warning or "attack" as an "alarm". If Applicant's "alarm" does not meet Feridun's definition of an "event", then Applicant must present the clear definition of Applicant's "alarm" to the Office during prosecution to overcome Feridun.

Claim Rejections - 35 USC § 112

7. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

8. Claims 1, 6, 8, 11, 13-14, 18, 20-23, and 26 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

9. The terms "a desirable state" and "when the current state of the service is undesirable" in claims 1, 8, 11, 14, 20, and 23 are relative terms which render the claims indefinite. The terms "desirable" and "undesirable" are not defined by the claims, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. Applicant failed to state what is meant by a "desirable state" and an "undesirable state".

Claim Rejections - 35 USC § 102

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

11. Claims 1-6, 9-13, 15-18, and 20-26 are rejected under 35 U.S.C. 102(e) as being anticipated by Feridun et al. (U.S. 6,336,139 B1).

12. In regard to claims 1, 11, 13, 21-23 and 26, Feridun disclosed:

Art Unit: 2145

multiple monitoring agents that each monitor a respective aspect of operation of one or more of the network components, wherein each monitoring agent detects events in the respective monitored aspect of operation and generates alarms as a function of the detected events;
(column 6, lines 20-40) and

an alarm correlation agent that receives the generated alarms from the monitoring agents, wherein the alarm correlation agent determines a current state of the service based on the received alarms (column 8, lines 15-45) and issues one or more instructions to autonomously establish a desirable state of the service when the current state of the service is undesirable (column 8, lines 56-61; column 10, line 63 – column 11, line 10).

13. In regard to claims 2, 9, 15 and 24, Feridun disclosed:

at least one of:

an infrastructure monitoring agent to monitor operation of the network infrastructure; (column 10, lines 45-52)

a computer system monitoring agent to monitor operation of at least one computer system on the network; (column 10, lines 52-62)

a network traffic monitoring agent to monitor traffic on the network; (column 10, line 63 – column 11, line 10)

an application monitoring agent to monitor operation of at least one application on the network; (column 10, lines 27-35)

a trouble-ticketing agent to receive reports of problems by users with respect to operation of the network;

a response time monitoring agent to monitor a response time of a communication on the network;

a device monitoring agent to monitor operation of a device on the network; and

a multicomponent monitoring agent comprising an aggregate of any of the above monitoring agents. (column 10, lines 45-63)

14. In regard to claim 3, Feridun disclosed:

Art Unit: 2145

the monitoring agents and the alarm correlation agent comprise reasoning agents.

(column 9, lines 1-22)

15. In regard to claims 4, 10, 12, 16-17, and 25, Feridun disclosed:

the reasoning agents comprise one or more of:

a rule-based reasoning agent; (column 9, lines 15-40)

a model-based reasoning agent;

a state-transition graph based reasoning agent;

a code book based reasoning agent; and

a case-based reasoning agent.

16. In regard to claim 5, Feridun disclosed:

an alarm repository that receives the generated alarms from the monitoring agents,

wherein the alarm correlation agent analyzes the alarms in the alarm repository. (column 8, lines 29-45)

17. Claims 6 and claims 18 and 20 contained substantially the same claim limitations as claims 1 and 5.

Double Patenting

18. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Art Unit: 2145

19. Claim 1 is rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claim 1 of U.S. Patent No. 6,430,712. Although the conflicting claims are not identical, they are not patentably distinct from each other because the mechanisms are equivalent as shown below.

| Instant Application Claim 1 | 6,430,712 Claim 1 |
|--|---|
| Multiple monitoring agents that each monitor a respective agent of operation of one or more of the network components, wherein each monitoring agent detects events in the respective monitored aspect of operation and generates alarms as a function of the detected events; and | Receiving a first alarm associated with a first resource of the plurality of resources, the first resource being associated with a first domain; receiving a second alarm associated with a second resource of the plurality of resources, the second resource being associated with a second domain; |
| An alarm correlation agent that receives the generated alarms from the monitoring agents, wherein the alarm correlation agent determines a current state of the service based on the received alarms and | Generating a third alarm based on the first and second alarms; |
| issues one or more instructions to autonomously establish a desirable state of the service when the current state of the service is undesirable. | Determining a corrective action based on the first and second alarms; and providing the corrective action to at least one of the plurality of resources. |

Conclusion

20. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Pohlmann et al. US 6,446,136 B1

Cowan et al. US 6,604,137 B2

Bergman et al. US 6,442,694 B1

Garg et al. US 6,327,677 B1

21. This is a request for continuing examination of applicant's Application No. 09/578,156. All claims are drawn to the same invention claimed in the earlier examination and could have been finally rejected

Art Unit: 2145

on the grounds and art of record in the next Office action if they had been entered in the application previously. Accordingly, **THIS ACTION IS MADE FINAL** even though it is a first action in this case. See MPEP § 706.07(b). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no, however, event will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey R. Swearingen whose telephone number is (571) 272-3921. The examiner can normally be reached on M-F 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jason Cardone can be reached on 571-272-3933. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Jason Cardone
Supervisory Patent Examiner